

**THE GRAPSID CRAB *PERCNON GIBBESI* (MILNE EDWARDS, 1853)  
(CRUSTACEA, DECAPODA, BRACHYURA), A NEW ADDITION TO THE  
MARINE FAUNA OF MALTA**

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**ABSTRACT**

The first records and known distribution in Maltese waters of the grapsid crab *Percnon gibbesi*, an alien species, are presented.

The grapsid Crab *Percnon gibbesi* (H. Milne Edwards, 1853) is distributed along the coasts of California to Chile, Florida to Brazil and Madeira to the Gulf of Guinea (Williams 1984). The first Mediterranean occurrence of this crab was reported in 1999 from the Balearic Islands (Garcia L. & Revireigo B., 2000) and it was later recorded from the island of Linosa (Pelagian Islands) (Relini *et al.*, 2000). A year later it was present in Pantelleria and mainland Sicily, where it was reported to be spreading rapidly and establishing stable populations (Pipitone *et al* 2001).

On 23 June 2001, a small crab was found dead at Tigne Beach, Sliema, Malta by one of the authors (J.A-M) and it was taken to the National Museum of Natural History (NMNH), Mdina, Malta for identification. The specimen

was identified as a female of either *Percnon gibbesi* or *P. planissimum*; the genus *Percnon* has not been reported previously from Maltese waters. After further examination the specimen was confirmed as *P. gibbesi*.

Another dead specimen, this time a male, was found at the same locality on 6 October 2001. Nineteen other individuals were observed in the Tigne Beach area between July and November 2001, when rough seas prevented further observation (see Table 1). Most observations included single specimens but groups of five and six were also observed. All specimens were amongst boulders at depths between 0.5 and 7 metres. The two dead specimens are deposited at the National Museum of Natural History, Mdina.



Photo John J. Borg

Fig. 1. The first specimen of *Percnon gibbesi* (Milne Edwards, 1853) found in Malta, a female from Tigne Beach, 23.06.01. (Scale graduation = 2 cm)

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Numerous observations of this crab were made in 2002, all from several rocky areas. The following were recorded in the summer of 2002: 5 individuals (2 adults and 3 juveniles) from il-Qaliet opposite the Cavalieri Hotel, 1 adult at Ghar Qawqla, Gozo and 1 adult at Mgarr ix-Xini, Gozo (D.Dandria pers comm.); 4 adults at Xlendi, Gozo and several individuals at Marsalforn, Gozo (M.Gatt and O. Spiteri pers.comm.). The crab was also noted in several localities along the Bahar ic-Caghaq coast (M.A.Falzon pers. comm.) and along the south coast of Malta (M. Spiteri pers. comm. and personal observations). The largest number was 37 individuals distributed over a relatively wide area at Tigné, counted by one of the authors (J. A-M) on 28 June 2002. An unconfirmed record from St. Julian's bay (M. Gatt pers. comm.) raises the possibility that this crab was already present in Maltese waters in the summer of 2000.

The carapace is disc-like, the front tridentate, deeply cut by antennular furrows; margins of median tooth armed with 2 spines, anterolateral margins with four acute teeth. All walking legs possess a row of spines on the anterior margin of the merus. Chelipeds with spinose merus and carpus, palm with small pilose area proximally on inner surface and pilose groove proximally on upper surface. The carapace is brownish in colour; the leg joints are marked with golden yellow rings. [Description based on Williams (1984) and Falciai & Minervini (1995)].

It is the authors' opinion that the introduction of this crab

in the Mediterranean may be the result of aquarium escapes, as the species is popular with marine aquarium enthusiasts. The species is known in the aquarium trade as "Sally Lightfoot", although this name was originally reserved for the grapsid species from the Galapagos Islands, *Grapsus grapsus*. But it is also possible that the introduction into the Mediterranean and eventual spread may be natural considering the west (Balearics) to east (Pantelleria, Sicily) spread.

At this stage the possible impact of this alien species on the local fauna can only be speculative. What is certain is that its numbers are increasing rapidly. D. Dandria (personal communication) made an interesting observation at Mgarr ix-Xini, Gozo, where a specimen, which he observed walking on a vertical rock face at a depth of only 20cm, was chased off by another crab, the indigenous *Pachygrapsus marmoratus*. It escaped very rapidly, seeming to "jump" through the water from one rock to another about 20 cm away. In fact this fast retreating behaviour has also been observed in other cases when these crabs were approached.

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Table 1. Records of *Percnon gibbesi* observed by the authors in 2001.

Date	Location	Depth	Number	Sex	Age	Status
23.06.01	Tigne Beach	0.5m	1	F	Adult	Dead
23.07.01	Sliema Pitch	7m	1	?	Adult	Live
05.09.01	Tigne Beach	1m	2	?	Adult	Live
03.10.01	Tigne Beach	1m	1	?	Adult	Live
04.10.01	Tigne Beach	1m	1	?	Adult	Live
07.10.01	Tigne Beach	5m	1	F	Adult	Dead
16.10.01	Ghar id-Dud pool	1m	1	M	Adult	Dead
21.10.01	Tigne Beach	1m	2	1M/1?	Adult	Dead
21.10.01	Tigne Beach	1m	5	?	2 ad. 3 juv	Live
01.11.01	Tigne Beach	1m	6	?	2 ad. 4 juv	Live

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